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REMARKS – General

By the above amendment, the applicant has amended all the claims to define
the invention more particularly and distinctly so as to overcome the technical
5   rejections and define the invention patentably over the prior art.

Claim Rejections

The last OA objected Claim 28 as " line 15 'server means' should be changed to
APs. Claim 28 has been amended as suggested by last OA.

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The last OA objected Claim 30 as "on line 18 "TDMN operation function means"
should be changed to Aps. Claim 30 has been amended as suggested by last
OA

The last OA objected Claim 36 as "on line 21 'TDMN operation function means'
15   should be changed to APs". Claim 36 has been amended as suggested by last
OA.

Claim Rejections under 35 USC § 112 have been overcome

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The last O.A. rejected the Claims 36-43, and 48. Claim 36-43, and 48 have
been amended to avoid technical rejection. Applicant requests reconsideration of
this rejection.

The last OA pointed out that the phrase "TDMU is a base communication
25   message unit of a communication protocol means constructed on top of TCP/IP
protocol and Internet' is vague and ambiguous". Claims 36-43, and 48 have
been amended as: "wherein said TDMU is the communication message unit of any
original source information for communication among PMADs and said TDMN via
Internet,

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The last OA rejected Claim 31 and 44-48 as "the specification does not
support the TDMN stores the undelivered message units when there is
interruption of Internet connection of receiving PMAD". The application

5   respectfully point out that the specification does support the claim as "The TDMN
(10) can store the TDMUs for a particular PMAD (30) when this destination
PMAD is not present to the TDMN (10), and distribute the stored TDMUs to that
PMAD (30) when it is present to the TDMN (10) next time" (page 8, Preferred
Embodiment – Operation lines 6-8). The applicant requests reconsideration of

10   this rejection.

Claim Rejections Under 35 USC § 103

Claim 28-30, 32, 34, 35, and 49 is rejected under 35 U.S.C 103(a) as being
15   unpatentable over Ogier (US 7,031,288) in view of Lo (US 6,031,818).

Ogier's embodiment is a completely different system as compared with the
applicant's current invention. In general, Ogier provides an ad-hoc node (Fig.1,
18)-based subnet (Fig.1, 10) system with Internet (Fig.1, 30) access via default
20   gateway (Fig.1, 16) (Fig.1, and description). Each node (Fig.1, 18) has its own
router (Fig.1, 14) and devices (Fig.1, 12):

    1)   Different AP: Ogier's GATEWAY (Fig.1, 16) is "a particular type of
routing node 14 that connects the subnet 10 to the Internet 30" (Col.4,
lines 13-15) for the subnet 10, which is an "ad hoc" routing network by
25   routing nodes 14. In another word, the GATEWAY of Ogier's system
does not provide direct Internet access for the devices (Fig.1, 12).
Instead, the whole "ad hoc" network of route nodes (fig.1, 14) together
provides the Internet access for device 12 (Fig.1, 12). As "the TBRPF
protocol performed by each of the routers 14 in the subnet 10 operates

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to inform a subset of the neighboring routers 14 in the subnet 10 of the
current network topology and corresponding link-state information.
Thus, for the examples above, each router 14 in the subnet 10 that
detects a change in a link to node A 12, (e.g., node B 14 in the cost of
5   the link (B, A)) operates as the source (i.e., source node) of an update.
Each source node sends a message to a neighbor of that source node,
informing the neighbor of the update to that link. Each router 14
receiving the update may subsequently forward the update to zero or
more neighbor nodes until the change in the topology of the subnet 10
10   disseminates to the appropriate routers 14 in the subnet 10" (Col.6,
lines 14-27). In the applicant's current invention, each PMAD can gain
Internet access via on AP at any given time, and there is no inter-AP
protocol application for client routing/addressing discovery as in Ogier's.

2)   Different Server: The TDMN server means is the core operational
15   function of the system of the applicant's current invention. However, the
server of Ogier's is just a typical Internet information server: "A server
40 is connected to the Internet 30 by a wire-line or wireless connection.
The server 40 can be internal or external to the subnet 10. For
purposes such as hosting application programs, delivering information
20   or Web pages, hosting databases, handling electronic mail ("e-mail"), or
controlling access to other portions of the Internet 30, the server 40 is a
computer system that typically handles multiple connections to other
entities (e.g., client systems) simultaneously." (col.3, lines 52-60).

3)   Different mobile device and Internet access; Ogier's node 18 has two
25   type of definition: "As used hereafter, a router 14 is any node 18 that
forwards IP packets not explicitly addressed to itself" (Col.4, lines 5-6)
and a device "an IP host 12 is any node 18 that is not a router 14.
Examples of devices that can participate as a node 18 in the subnet 10
include laptop computers, desktop computers, wireless telephones, and

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personal digital assistants (PDAs), network computers, television sets
with a service such as Web TV, client computer systems, server
computer systems."(col.4, lines 6-14). Apparently, the device 12 (Fig.1,
12) is supposed to be analogous with the PMAD of the applicant's

5   current invention. However, Ogier's host 12 only accesses via the
router node (Fig.1, 14) and its "ad hoc" routing network and then via the
GATEWAY (Fig.1, 16) to Internet.

    4)   Different system and functions: as pointed out by last OA, Ogier's is
lacking server's function for communication control, a virtual

10   communication path, message communication guarantee, and so on.
This is because Ogier's system is about IPV4 and V6 addressing
conversion among/between local subnets and the Internet. Message
. communication is completely ignored.

15   Lo (US 6,031,818) provides a client/server-based communication system
(Fig.1, 120, 130) for multicast broadcast message redistribution and repair (Fig.1
120, 130, 140,160)

It is technically improper to modify the system of Ogier's by having the server
means of Lo to "enable and control communication whereby the server means

20.   guarantees communication without message loss by storing and resending
communication message to ensure message delivery (server unit retransmits the
lost data packet, abstract) and virtual communication paths (col.1 lines 11-13) as
suggested by last OA, because of:

    1)   Different servers: Lo provides "System 100 consists of a multimedia

25   source 110 at a first location, which multicasts the packets out to
several destination locations, including a server unit 120 and a client
unit 130 (col.3, lines 29- 31)" Lo's server 120 is to buffer the source
server110, and client 130 is the local server for receiver 140 (Fig.1 and
it description) for multicast broadcasting enhancement. Ogier's server

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(Fig.1, 40) is "For purposes such as hosting application programs, delivering information or Web pages, hosting databases, handling electronic mail ("e-mail"), or controlling access to other portions of the Internet 30, the server 40 is a computer system that typically handles

5   multiple connections to other entities (e.g., client systems) simultaneously.(col.3, lines 54-60). Ogier's Gateway (Fig.1, 16) is a typical default Internet gateway router for subnet 10 or 20 (fig.1, 10, 20) as "router 14 is any node 18 that forwards IP packets not explicitly addressed to itself, and an IP host 12 is any node 18 that is not a router

10 14. Examples of devices that can participate as a node 18 in the subnet 10 include laptop computers, desktop computers, wireless telephones, and personal digital assistants (PDAs), network computers, television sets with a service such as Web TV, client computer systems, server computer systems. The gateway 16 is a particular type of routing node

15 14 that connects the subnet 10 to the Internet 30" (col.4, lines 5-15). To the applicant's best understanding, the functions of Lo's servers (110, 120, 130) should be implemented to Ogier's server 40 (fig.1), because that Ogier's gateway 16 is a router, although topologically it should be the client (130) of Lo's embodiment. Fundamentally, these two systems

20 cannot be combined because Lo's is server client message communication enhancement system, while Ogier's system is an IP subneting system with a default router for addressing conversation. The TDMN server means of the applicant's invention is a message communication core with end device (PMAD) communication

25 management.

2) Different system: Lo provides a typical server (110) to client (140) communication system (Fig.1, 110, 140) with buffering for quality enhancement (Fig.1, 120, 130). Ogier's system is an IP subneting system with a default router for addressing conversation (Fig.1 and it

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description). Communication message reliability function of Lo's
system cannot possibly be implemented with Ogier's system, because
no network element of Ogier's system is in the logical path of doing
multicast packet detection and repairing as suggested.

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3)   Different communication guarantee feature between Lo's system and
the applicant's current invention regardless of the system difference
between Lo's system and the applicant's current invention. Function
wise, Lo's system only provides a solution for server sources (Fig.1,
10   110) to receiver (Fig.1, 140) one directional multicasting buffering. In
fact, Lo's only provides the partial solution between server and client
(Fig.1, 120, 130). Lo's system does not guarantee broadcasting to
receivers 140, because (A) the communication between source (Fig.1,
110) and server (Fig.1, 120) is not guaranteed. (B) The communication
15   in local broadcasting is not guaranteed (Fig.1, 130 to 140, local
multicast). The TDMN server means of the applicant's current invention
provides a bi-directional communication among PMADs and servers.
Therefore, even if Lo's feature can be implemented to Ogier's system,
the new system is still going to be a one way partially guaranteed
20   communication system.

4)   Different virtual communication path. Lo mentioned "The Internet
Multicast Backbone ("MBone"), is a virtual network on the Internet,
which has been in existence beginning as a research tool since the
early 1990s" (Col.1, lines 11-13), is the MBone virtual network that
25   currently running among MBone servers and routers for audio/video
multicasting over the Internet. In Lo's system, source and server (Fig.1,
110, 120) are part of the MBone virtual network, if at all. The virtual path
of the applicant's current invention is the protocol communication path
among communicating PMADs and TDMN server means.

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It is in fact to the applicant's advantage for the last OA to suggest combining both Ogier and Lo to improve reliability of message delivery of wireless mobile communication over Internet. Essentially, the last OA acknowledges that a better technology is needed to do a reliable wireless mobile multimedia communication

5   over the Internet to address mobile device address change over the Internet while having reliable message communication. The applicant's current invention is far more superior over Ogier's embodiment and/or new embodiment, even if it could be combined with Lo's system.

10   Therefore, the applicant suggests that combining Ogier with Lo is technically both impossible and improper. The applicant respectfully requests withdrawal of these rejections.

Allowable Subject Matter

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Regarding claim 33, the claim has been amended as pointed out by last OA for allowance.

20   **Conclusion**

For all of the above reasons, the applicant submits that the claims are now in proper form, and that the claims all define patentably over the prior art. Therefore he submits that this application is now in condition for allowance, which action he

25   respectfully solicits.

Conditional Request For Constructive Assistance

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Applicant has amended the specification and claims of this application so that
they are proper, definite, and define novel structure which is also unobvious. If,
for any reason this application is not believed to be in full condition of allowance,
Applicant respectfully request the constructive assistance and suggestions of the
5   Examiner pursuant to M.P.E.P. § 2173.02 and § 707.07(j) in order that the
undersigned can place this applicant in allowable condition as soon as possible
and without the need for further proceedings.

<div style="text-align:center">Very respectfully,</div>

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